CONNECTICUT ACADEMIC PERFORMANCE TEST
Modified Assessment System
(MAS)

Performance Level Descriptors
for
Mathematics

Prepared by the Bureau of Student Assessment
Connecticut State Department of Education
2010

CAPT **Connecticut Academic Performance Test**
Modified Assessment System (MAS)
Mathematics Performance Level Descriptors **2010**

CAPT Performance Level Descriptors for Mathematics		
Goal Level When provided with modifications such as more accessible presentation of text and graphics, embedded graphic organizers, formulas and charts, and scaffolding of multi-step problems, students who perform at this level are likely to demonstrate adequately- to well-developed conceptual understanding, computational skills, and problem-solving skills. Typically, the solutions these students provide to mathematics problems are accurate and include complete explanations. Generally, for each content standard listed below, students who perform at the Goal level on the CAPT MAS Mathematics test **competently**:	**Proficient Level** When provided with modifications such as more accessible presentation of text and graphics, embedded graphic organizers, formulas and charts, and scaffolding of multi-step problems, students who perform at this level are likely to demonstrate partially developed conceptual understanding, computational skills, and problem-solving skills. Typically, the solutions these students provide to mathematics problems are partially accurate and include some explanations. Generally, for each content standard listed below, students who perform at the Proficient level on the CAPT MAS Mathematics test **marginally**:	**Basic Level** When provided with modifications such as more accessible presentation of text and graphics, embedded graphic organizers, formulas and charts, and scaffolding of multi-step problems, students who perform at this level are likely to demonstrate limited conceptual understanding, computational skills, and problem-solving skills. Typically, the solutions these students provide to mathematics problems are inaccurate and include minimal to no explanations. Generally, for each content standard listed below, students who perform at the Basic level on the CAPT MAS Mathematics test **have a limited ability to**:

Algebraic Reasoning: Patterns and Functions

- Recognize relationships using patterns and functions
- Represent linear functions and relations symbolically and with tables and graphs
- Manipulate equations and functions to solve problems

Numerical and Proportional Reasoning

- Extend the understanding of number to include integers, rational numbers and real numbers
- Compute and estimate using properties of number systems to solve problems
- Solve proportional reasoning problems

Geometry and Measurement

- Investigate relationships among plane geometric figures using geometric models, constructions and tools
- Develop mathematical arguments
- Verify geometric relationships using algebra, coordinate geometry and transformations
- Solve a variety of problems involving one- and two-dimensional measurements using geometric relationships and trigonometric ratios

Working with Data: Probability and Statistics

- Select the appropriate visual or graphical representation of real data
- Analyze real-world problems using statistical techniques
- Understand and apply the principles of probability in a variety of situation